



Tech Info Library

Network Troubleshooting: Symptoms & Causes (4/94)

Revised: 4/13/94
Security: Everyone

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Article Created: May 16, 1991
Article Reviewed/Updated: 13 April 1994

TOPIC -----

Troubleshooting a network can be much more difficult than troubleshooting a single piece of equipment. This is because many devices might be involved. Because of this, you should use a systematic approach to isolating and resolving the problem.

DISCUSSION -----

Below is a list of possible symptom/cures to be referenced when troubleshooting network problems. The list is based on LocalTalk, Ethernet, Token Ring, and Star networks--but can be adapted to other topologies. If you are a service provider, additional information can be found in Apple Technical Procedures. In addition, there are other articles in the Tech Info Library that may assist you.

Missing Device Problems

Symptoms:

- Can't access file server.
- Can't access printer.
- Can't access another zone on the network.
- Can't access another network.

Possible causes:

- Break in connector.
- Broken or damaged pins on connector box.
- Device turned off.
- Cables severed or damaged.
- Disconnected cable extenders.
- Network interface card damaged, missing, or not installed properly.
- System software versions not consistent across the network.
- Incorrect printer or other device drivers.

Appropriate cdev and/or adev missing or not in System folder.

Token Ring:

- MAU not connected.
- Bad MAU port.
- Ring In/Ring Out bad or not connected.

STAR:

- Star Controller turned off, not plugged in or is malfunctioning.
- Wires not punched down or punched down correctly.
- Punchdown block not connected to Star Controller.

Ghosting Problems

Symptoms:

- Network device appears and disappears in the Chooser.

Possible causes:

- Loose connector.
- Damaged or obstructed cable.
- Improper termination.
- Loose cable extenders.
- Maximum cable length exceeded (check user manual).
- Maximum number of nodes exceeded.
- Electro-magnetic interference.
- Network not designed properly.

Performance Degradation

Symptoms:

- Slow printing
- Slow file transfer
- Network appears to be dead.

Possible causes:

- Maximum number of nodes exceeded.
- Excessive traffic.
- System software versions not consistent across the network.
- Virus.

File Folder Access

Symptoms:

- Can't see files or folders.
- Can't open files or folders.
- Can't drop files or folders into drop folder.
- Can't change file or folder name.
- Can't move file or folder.

Possible causes:

Access privileges set incorrectly.
Files or folders locked.

Article Change History:

13 Apr 1994 - Reviewed for technical accuracy.

Support Information Services

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Tech Info Library Article Number:7084